

ABSTRACT

A DC to DC converter includes a comparator, a driver, and a pair of switches. The comparator compares the output voltage with a reference voltage signal and generates a PWM signal. The driver drives the switches so as to force the
5 output voltage to follow the reference signal. In a multiphase architecture, two or more such converter circuits are incorporated to minimize the output voltage ripple and further reduce the recovery time. In a two-phase architecture, two reference signals are phase-shifted by 180 degrees. In an N-phase architecture, the reference signals are phase-shifted by $360/N$ degrees.